

IN THE CLAIMS

B2 1. (Amended) A welding power source capable of receiving a range of input voltages, comprising:

an input rectifier configured to receive an ac input and providing a first dc signal;

[a dc voltage stage configured to receive the first dc signal and providing a second dc signal;]

[an inverter] a converter configured to receive the first [second] dc signal and [providing a second ac signal] to provide a converter output, and configured to receive at least one control input;

an output transformer configured to receive the [second ac signal] converter output and to provide [providing] a third ac signal having a current suitable for welding;

an output circuit configured to receive the third ac signal and providing a welding signal; and

a controller, including a power factor correction circuit, configured to provide at least one control signal to the inverter[; and

an auxiliary power source configured to receive a range of input voltages and providing a control power signal to the controller].

1 2. (Amended) The apparatus of claim 1, further  
2 including an [wherein: the] auxiliary power source [is] capable of  
3 providing [the] a control power signal at a preselected control  
4 signal voltage, regardless of the magnitude of the ac input  
5 signal.

B3 4. (Amended) The apparatus of claim 1, wherein the  
2 [dc voltage stage] converter includes a boost circuit.

1 5. (Amended) The apparatus of claim 1, wherein the  
2 [inverter] converter includes a pulse width modulator.



1 9. (Amended) A method of providing a welding current  
2 from a range of input voltages, comprising:

3 [rectifying an ac input and providing a first dc  
4 signal];

5 converting and power factor correcting the ac [dc]  
6 signal to a second ac signal; and

7 transforming the second ac signal into a third ac  
8 signal having a current suitable for welding[; and

9 receiving the ac input and providing an auxiliary power  
10 signal source at a preselected control power signal voltage,  
11 regardless of the magnitude of the ac input signal].

1 10. (Amended) The method of claim 9, wherein the  
2 step of converting the ac [dc] signal includes the steps of  
3 converting the dc signal to a [second] dc signal and inverting  
4 the [second] dc signal to provide the second ac signal.

1 12. (Amended) The method of claim 9, [wherein the]  
2 including a step of providing [the] auxiliary power signal  
3 [includes the step of] by transforming the ac input signal.

1 17. (Amended) A welding power source for providing a  
2 welding current from a range of input voltages, comprising:  
3 rectifier means for receiving an ac input and providing  
4 a first dc signal;

5 converting means for converting and power factor  
6 correcting the dc signal to a second ac signal; [and]

7 transforming means for transforming the second ac  
8 signal into a third ac signal having a current suitable for  
9 welding; and

10 output means for providing a welding current[; and

11 auxiliary power means for receiving the ac input and  
12 providing an auxiliary power signal source at a preselected  
13 control power signal voltage, regardless of the magnitude of  
14 the ac input signal].